How Canada compares in the G8

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France initiated the first G6 (Group of Six) meeting in 1975, inviting five countries to discuss current global economic issues. Today, eight countries rotate hosting an annual summit to discuss not only the global economy, but also political and social problems (see *History of the G8*). The G8—Canada, France, Germany, Italy, Japan, the Russian Federation, the United Kingdom and the United States—are some of the most industrialized countries in the world. Given their economic, political and military weight, they can influence global developments and manage global crises. Using labour and economic data from the Organisation for Economic Co-operation and Development (OECD), the World Trade Organization, and other international databases, this article presents selected indicators to describe how Canada compares with the other members of the G8, indicating changes since the early 1990s (see *Data sources and definitions*).

Small group, big economic power

Given Canada's population, it is somewhat of a feat to belong to the G8, where membership is contingent on being a major economic power. In fact, the eight countries account for only 13% of the world's population, but 46% of the global economy (Table 1). In other words, these eight countries are responsible for almost half the value of goods and services produced around the world.

The economic strength of the United States is clearly evident, with a share of world GDP (21.0% in 2004) almost five times greater than its proportion of world population (4.6%). Despite being the smallest G8 country, Canada's share of GDP (1.8%) in 2004 was 3.6 times greater than its share of population, a ratio only slightly below the United Kingdom's. These proportional differences in GDP and population translate into the highest GDP per capita figures for the United States, the United Kingdom and Canada—$39,800, $31,100 and $31,000 respectively in 2004. Standardized per capita GDP gives an indication of relative economic well-being. Even though Russia had by far the lowest GDP per capita in the G8 ($10,000), it was still almost twice as high as the average for all non-G8 countries ($5,400).

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History of the G8

The G8 has its roots in the early 1970s with two precursor groups known as the Brussels Group (1971) and the Library Group (1973). Both included selected developed democratic countries that met to discuss world issues, but meetings were largely confidential. One year after the Library Group was formed (France, Germany, the United Kingdom, and the United States), Japan joined. Subsequently, the group developed into the 'G6' when President Giscard d'Estaing of France invited the 'G5' plus Italy to Rambouillet to discuss global economic problems. Canada joined in 1976 to make the G7, and Russia in 1998 to make the G8.

The G8 does not have a permanent administration. Each of the former G7 countries rotates holding a year-long presidency and hosting a summit. Canada has hosted four summits—in Ottawa and Montebello (1981), Toronto (1988), Halifax (1995) and Kananaskis (2002)—and is scheduled to host again in 2010. Russia will host for the first time in 2006.

At each summit, leaders from the countries meet to discuss major global issues of the day—economic, political or social. For example, the main issues for the 2005 summit will include Africa and climate change. Representatives from all countries try to reach non-binding agreements on how to resolve problems. The G8 has been responsible for instigating the Global Health Fund (targeted at fighting AIDS, tuberculosis and malaria), the Heavily Indebted Poor Countries Initiative (which sets out a process to cancel the national debt for very poor countries), and the New Partnership for Africa's Development.

Canada had the highest rate of economic expansion between 2000 and 2004

Canada's GDP grew by 1.2% annually between 1990 and 1994, 3.7% between 1995 and 1999, and 3.1% between 2000 and 2004, placing it sixth, second and

Table 1 Population and GDP[1] of the G8, 2004

	Population		GDP		GDP per capita
	millions	%	US $ (billions)	%	US $
World	**6,379.2**	**100.0**	**55,500**	**100.0**	**8,700**
G8	857.8	13.4	25,516	46.0	29,744
United States	293.0	4.6	11,665	21.0	39,807
United Kingdom	60.3	0.9	1,877	3.4	31,142
Canada	32.5	0.5	1,007	1.8	30,971
Japan	127.3	2.0	3,835	6.9	30,115
France	60.4	0.9	1,804	3.3	29,859
Germany	82.4	1.3	2,310	4.2	28,025
Italy	58.1	0.9	1,610	2.9	27,730
Russia	143.8	2.3	1,408	2.5	9,793
Non-G8	5,521.3	86.6	29,984	54.0	5,431

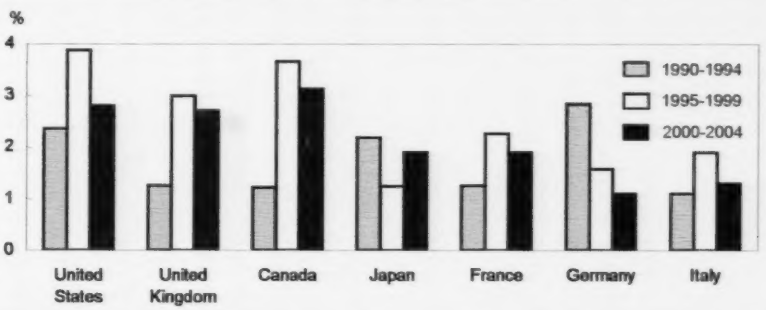
Sources: The World Factbook; OECD Main Economic Indicators
1 A purchasing power parity (PPP) dollar calculation of all goods and services produced in a country.

first in the three periods[1] (Chart). Most countries followed this global recession and recovery pattern, with the lowest economic growth between 1990 and 1994 and the greatest between 1995 and 1999. Germany, however, had the highest growth rate in the G7 countries between 1990 and 1994[2] (2.8%) but saw consecutive reduced rates of 1.6% and 1.1% in the next two periods. This was partly due to the disruption following the fall of the Berlin Wall in 1989 and the subsequent blending of wealthier West Germany and former communist East Germany. France, Italy and Japan have all had relatively weak performances since 1990 (GDP growth rates of 2.3% or less). The United States was among the top three countries in terms of GDP growth rate for all three periods.

Export trade accounts for one-third of Canada's GDP

An important factor in economic expansion for many countries is the amount of international trade activity. This is especially important for a country like Canada, which has a relatively small domestic market. Many countries began to formally harmonize their trade practices with the General Agreement on Tariffs and Trade in 1948, and the creation of the World Trade Organization in 1995. Trade is also becoming increasingly important to many large non-G8 countries such as China (see *Emerging markets*). Canada has participated in a flurry of liberalized trade agreements during the past 15 years, including the 1989 Canada-U.S. Free Trade Agreement, the 1994 North American Free Trade Agreement, and the soon-to-be-adopted 2005 Free Trade Area of the Americas (covering 34 countries). The increase in free trade (the reduction or elimination of trade barriers such as tariffs or quotas), technological advances in communication, lower transportation costs, and innovation have all profoundly changed how and where business is done. Increasingly, the world of doing business has come to mean doing business with the world.

Chart Canada's average growth in GDP improved markedly after the early 1990s.



Source: OECD Productivity Database
Russia excluded, data for unified Germany began in 1991.

Data sources and definitions

This article uses figures from several organizations that regularly collect and publish standardized international data. However, whereas the Central Intelligence Agency (CIA) and the World Trade Organization (WTO) seek to cover almost all countries in the world, the Organisation for Economic Co-operation and Development (OECD) generally focuses on its 30 member countries—which include all the G8 countries except Russia. The OECD nonetheless attempts to include economic and labour market indicators for several significant non-member countries, such as Russia, but readily admits that the data collection process is less well-established in non-member countries and therefore "time series are generally not very long, and are less reliable" (OECD 2005b, p 225). For Germany, data prior to 1991 are only for West Germany (Federal Republic of Germany). Information and the data used in this article can be obtained from the following Web sites:
OECD: www.oecd.org
WTO: www.wto.org
World Fact Book (CIA): www.odci.gov
U.S. Bureau of Labor Statistics: www.bls.gov

The article presents many well-known labour market and economic indicators. However, many other indicators could have been used—for example, youth unemployment, long-term unemployment, income distribution, the consumer price index, interest rates, or the national debt.

Although all the organizations mentioned above are diligent in attempting to standardize concepts, methods and definitions in order to allow for international comparisons, some differences will exist nonetheless. Therefore, some caution must be taken when interpreting individual year differences between countries, and small differences in particular should be considered as "falling in a margin of uncertainty" (OECD 2005a, p 11). For examples of some of the work done on international comparisons, see Baldwin et al. 2005 and OECD 2005a.

Real **gross domestic product** (GDP) is commonly used to estimate total economic activity, after adjusting for inflation, and is therefore a good measure for determining how well an economy is doing.

Purchasing power parity (PPP) is the rate at which currency of one country must be converted into currency of another country to buy an equivalent basket of goods and services. PPPs eliminate the differences in price levels among countries and therefore fluctuate much less than market exchange rates. The common currency used in this article is the U.S. dollar. The OECD uses regularly updated PPPs developed by the OECD-Eurostat PPP program.

Merchandise trade is the buying (importing) and selling (exporting) of all types of goods, which can range from raw primary products to specialized manufactured products. Trade in services is excluded since it is a relatively small activity and the coverage and comparability across countries are subject to significant distortions (www.wto.org).

The **labour force** is the civilian, non-institutionalized population over a country-specific minimum age (15 in Canada) who at the time of the survey were employed or unemployed.

Employment rate is the percentage of the working-age population that is employed. For example, the rate for the core working-age population would be the number of persons aged 25 to 64 who are employed divided by the total population that age.

Educational attainment is a standardized set of indicators summarizing the highest level of education attained. The OECD codes education levels according to the International Standard Classification of Education, which allows for international comparison. A common sub-classification is:

Below upper secondary: less than a high school diploma.

Upper secondary and postsecondary non-tertiary: graduation from high school or completion of a postsecondary program that generally lasts six months to two years. Program names include trade/vocational certificate and community college certificate.

Tertiary: includes higher level vocational and technical programs that usually last 1.5 to 3 years and result in a college diploma, and university certification programs (diploma, bachelor's degree, first professional degree, etc.).

For more information, see www.oecd.org/edu/eag2004.

The importance of external trade to the economy is shown by the $US 322 billion in goods that Canada exports. This represented almost one-third (32%) of GDP (Table 2). An increase in exports means more economic activity for a country, and all G8 members have witnessed such an increase since 1990. At 252%, Canada had the greatest increase in export trade over the past decade. Total merchandise exports tended to be less important (18% of GDP or less) for the larger countries (Japan, Russia and the United States). After three years of consecutive decreases, Canada's exports increased by just over $US 49 billion in 2004 (data not shown), resulting in a record trade balance of $US 46 billion. Increases in industrial goods and energy products were particularly strong, as was the extent of export trade with the United States, despite the appreciation of the Canadian dollar[3] (Department of Foreign Affairs and International Trade 2005; Cross 2005).

Table 2 Indicators for total merchandise trade among the G8, 2004

	Imports	Exports	Trade balance[1]	Export trade: Share of GDP[2]	Export trade: Growth since 1990
	Current US $ (billions)			%	
United States	1,526.4	819.0	-707.4	7	208
United Kingdom	462.0	345.6	-116.4	18	187
Canada	275.8	322.0	46.2	32	252
Japan	454.5	565.5	111.0	15	197
France	464.1	451.0	-13.1	25	208
Germany	717.5	914.8	197.3	40	217
Italy	349.0	346.1	-3.0	21	203
Russia	94.8	183.2	88.4	13	..

Source: World Trade Organization
1 Exports minus imports.
2 For comparability with the trade data, GDP is expressed in current US dollars.

Canada has an aging but well-educated labour force

Employment growth is often linked to increases in economic activity and the qualifications of the population. One indicator that is widely used to track the state of the economy is the employment rate—the percentage of the working-age population that is employed. Trends in the rate for those aged 25 to 64 (the core working-age population) among the G8 are remarkable in both consistency and extent. The overall employment rate between 1976 and 2003 rose substantially in Canada (9.1 percentage points) and the United States (6.9 points), while it dropped slightly in two countries: France and Germany (Table 3). These changes result from varying decreases for men and increases for women, reflecting the almost universal increase in women's labour force participation, and a younger average retirement age for men.

While Italy had the largest employment rate difference between the sexes in 2003 (27.8 percentage points), Canada had the smallest (9.7 points)—largely because Canadian women had the highest employment rate (68.5%) of all G8 countries. Between 1976 and 2003, Canada moved from sixth to third in terms of the overall employment rate.

As mentioned, employment growth is also generally associated with increasing educational qualifications—which are more pertinent than ever in today's global and technological economy . And indeed, more and more people in each G8 country have been acquiring higher levels of education (Table 4). In 2002, 43% of Canada's population aged 25 to 64 had a high-level vocational diploma, college diploma or university degree—the highest rate in the G8 (see *Data sources and definitions*). Over one-third of this age group in Japan (36%) and the United States (38%) had also attained a tertiary or high level of education.

The employment rate among those with advanced education was 80% or higher in all G8 countries in both 1991 and 2002 (Table 4). In contrast, employment rates ranged between only 50% and 67% for those with less than high school education in both years. Given the correlation between advanced education and employment, it is not surprising to find that the four countries with the most highly educated populations (Canada, Japan, the United Kingdom and the United States) also had the highest overall employment rates in 2003 (Tables 3 and 4).

Table 3 Employment rates in the G7

Age 25 to 64	1976	2003	Change
Both sexes		%	
United States	64.3	71.2	6.9
United Kingdom	70.3	74.2	3.9
Canada	64.2	73.3	9.1
Japan	69.1	73.9	4.8
France	66.0	63.0	-3.0
Germany[1]	65.6	65.4	-0.2
Italy	52.2	57.1	4.9
Men			
United States	79.3	76.9	-2.4
United Kingdom	86.7	81.0	-5.7
Canada	80.7	78.2	-2.5
Japan	87.8	86.7	-1.1
France	81.8	69.2	-12.6
Germany[1]	83.4	71.4	-12.0
Italy	76.6	71.0	-5.6
Women			
United States	49.8	65.7	15.9
United Kingdom	54.0	67.4	13.4
Canada	47.7	68.5	20.8
Japan	51.0	61.0	10.0
France	50.3	56.9	6.6
Germany[1]	48.6	59.3	10.7
Italy	29.0	43.2	14.2

Source: OECD on-line Labour Statistics Database
1 Only West Germany in 1976.

Table 4 Selected labour market indicators of the G7 for those aged 25 to 64

	United States	United Kingdom	Canada	Japan	France	Germany	Italy
Educational attainment[1]				%			
1991							
Below upper secondary	16	35	30	..	49	18	72
Upper secondary and postsecondary	54	49	42	..	36	60	22
Tertiary	30	16	28	..	15	22	6
2002							
Below upper secondary	13	16	17	16	35	17	54
Upper secondary and postsecondary	49	57	40	47	41	60	36
Tertiary	38	27	43	36	24	23	10
Employment rate by educational attainment							
1991							
Below upper secondary	52	61	55	..	58	51	54
Upper secondary and postsecondary	74	78	75	..	78	74	74
Tertiary	85	86	82	..	85	86	87
2002							
Below upper secondary	57	53	55	67	58	51	50
Upper secondary and postsecondary	74	79	76	74	77	70	72
Tertiary	83	88	82	80	83	84	82
Overall unemployment rate							
1993	6.9	10.0	11.4	2.5	11.1	7.7	10.1
1998	4.5	6.2	8.3	4.1	11.1	9.1	11.7
2003	6.0	5.0	7.6	5.3	9.4	9.6	8.6
Average actual hours worked per week				Hours			
1993	35.1	33.1	33.0	36.6	30.5	29.6	31.2
1998	35.4	33.3	33.7	35.4	29.7	28.6	31.2
2003	34.5	32.2	33.0	34.6	27.5	27.8	30.6

Source: OECD
1 Levels have been classified according to an international coding system.
Note: The selection of years was largely based on what was currently available from the OECD.

Unemployment rates in the G8 ranged between 3% and 12% from 1993 to 2003, with Canada near the middle of the pack (7.6% in 2003). However, average work hours trended down in all countries except Canada, which had an average of 33 hours per week in both 1993 and 2003. Since 1993, Japan has witnessed an average workweek reduction of 2 hours, from 36.6 to 34.6, but still had the longest workweek of the G8 in 2003. France, on the other hand, had the shortest, dropping three hours to 27.5. Reasons for a drop in average work hours include legislative change (France[4]), an aging labour force, and an increase in part-time work (see Galarneau 2005).

Finally, Canada's aging labour force has been the focus of a great deal of discussion, but in reality we are simply catching up to the older age distribution of workers in the other G8 countries. Only one-third of the Canadian workforce was aged 40 or over in 1983, compared with one-half in 2003 when the proportion in the other G8 countries ranged from 46% to 57% (Table 5). After 1983, Canada and the United States saw substantial increases (15 and 13 percentage points respectively) in the proportion of the workforce 40 and older, mostly because of the aging of the generation born after the Second World War. An aging labour force is not a concern in itself, having more to do with the impact of this demographic bulge as it moves out of the labour market, including possible skill shortages.[5]

Manufacturing output and cost both relatively low in Canada

Cross-country labour output and cost indicators are usually developed using the manufacturing sector because data are readily available and because the industry often includes the bulk of a country's merchandise trade (Sharpe 1990). Data are converted into a common currency (U.S. dollars), and indexed to gauge the rate of change. Labour productivity is expressed as output per hour—that is, total GDP in manufacturing divided by total hours worked in the industry.[6] Productivity rates (1992=100) have increased in all G8 countries over the past decade (Table 6). The United States showed the largest increase between 1992 and 2003 (80%) and Italy the smallest (10%). Canada had a below-average growth in labour productivity (35%).

On the other hand, the hourly compensation for employees also increased in all countries, with the U.S. showing the greatest gain (60%) and Italy the least (1%). Canada had the second lowest hourly compensation gain (13%).

Conversely, except for the United Kingdom and Italy, the unit labour cost, which is wages and benefits per unit of manufactured product, fell in all countries between 1992 and 2003, particularly Canada and France where the drop was almost 20%. Since labour is often the biggest factor in production cost, lower unit labour costs can improve a country's position. Although it seems contradictory to have hourly compensation rates go up at the same time as unit labour costs go down, this is possible when labour productivity increases. Specifically, when more goods can be produced in fewer hours, as was the case between 1993 and 2003, both wages and profits can increase.

Emerging markets

China, India and Brazil are three of the most populated countries in the world, and their economies and international trade activity have been growing almost exponentially. China alone has had an annual average growth of 9.3% in real GDP since 1993, with GDP totalling $US 1,600 billion in 2004. However, GDP per capita in these three countries is still relatively low at $US 1,230, $US 610 and $US 3,030 respectively for China, India and Brazil. Although Canada's total trade activity with these three ($US 28.1 billion) represented only 4.7% of its trade activity worldwide in 2004, the figure is expected to grow, especially for China (Roy 2005).

Economic indicators of emerging markets,[1] 2004

	China	India	Brazil
Population (millions)	1,299	1,065	184
GDP ($ billions)	1,601	655	558
GDP per capita ($)	1,232	615	3,033
Annual average GDP growth rate, 1993 to 2003 (%)	9.3	6.1	2.6
Total merchandise trade with Canada ($ billions)	23.6	1.8	2.7
Canadian exports ($ billions)	5.1	0.8[2]	1.1
Canadian imports ($ billions)	18.5	1.0[2]	1.6

Sources: Department of Foreign Affairs and International Trade; Statistics Canada
1 Currency figures are in U.S. dollars.
2 2003 data.

Table 5 Proportion of labour force aged 40 or over in the G7

	1983	2003
	%	
United States	38	51
United Kingdom	42	49
Canada	34	49
Japan	52	57
France	41	50
Germany	45	53
Italy	42	46

Source: OECD

Conclusion

Labour and economic data for the G8 demonstrate that this group includes some of the most economically powerful countries in the world. Their economic expansion has been continuous over the past 15 years, and the extent of their economic power is reflected in the 2004 average GDP per capita figure of $US 29,700, compared with $5,400 for non-G8 countries.

Canada has made significant gains in average annual economic expansion, moving from one of the lowest rates in the early 1990s to the highest during the most recent period (2000 to 2004). International trade has played a key role in this process.

Table 6 Selected manufacturing output and cost indicators for the G7

1992=100		United States	United Kingdom	Canada	Japan	France	Germany	Italy
					US $			
Output per hour	1993	102.7	103.8	105.8	101.7	101.0	101.8	101.2
	1998	130.2	108.4	117.7	121.2	127.9	122.0	110.8
	2003	180.4	134.9	134.5	154.3	158.0	135.1	110.9
Hourly compensation	1993	102.0	88.9	95.6[1]	117.2	96.3[1]	100.4	82.8
	1998	118.7	115.4	91.9[1]	111.7	101.1[1]	113.3	86.7
	2003	159.6	148.4	112.7[1]	135.3	127.0[1]	132.8	100.8
Unit labour costs	1993	99.3	85.6	90.4	115.3	95.3	98.7	81.8
	1998	91.2	106.5	78.1	92.2	79.1	92.9	78.2
	2003	88.5	110.0	83.8	87.7	80.4	98.3	90.9

Source: U.S. Bureau of Labor Statistics
1 Compensation adjusted for employment taxes and government subsidies to estimate the actual labour cost to employers.

Canada also fared well in terms of employment rate growth among the working-age population as well as in the educational attainment of this age group. By 2003, Canada had the third highest employment rate (73.3%) for those aged 25 to 64, up from 64.2% and sixth place in 1976. Also, Canadian women had the highest rate (68.5%) in the G8. Canada and the United States experienced a considerable baby boom after the Second World War and are currently facing a rapidly aging workforce, a situation that could affect labour replacement rates.

Although Canada has managed to control rising labour costs over the past decade and add to its competitive edge, its labour productivity gains have been substantially below those of France, Japan and the United States. However, all in all, the global economic picture indicates that Canada is keeping up with, and in many cases surpassing, its G8 partners.

Perspectives

Notes

1 Canada's annual average GDP growth rates were relatively stronger between 2000 and 2002 than in 2003 and 2004.

2 Although the Berlin Wall was dismantled in 1989, West and East Germany were not officially reunited until late 1990, so most series show combined German data starting in 1991.

3 The strength of a country's currency can be an important factor in improving or reducing cost competitiveness. For example, if the Canadian dollar appreciates in relation to the currency of other countries, our manufactured exports become more expensive to buy, and companies are often forced to cut the export price in order to remain competitive. However, some hidden advantages of a rising dollar can counter the changing price of exports and improve competitiveness. For example, depending on the industry, many manufactured goods require imported material, which will cost less because of a stronger dollar. Also, Canadian companies with U.S. debt, or those who import machinery or equipment to produce their goods, would also benefit from currency appreciation.

4 In 1998 and 2000, the French government passed legislation that reduced the workweek to a maximum of 35 hours.

5 The changing characteristics of older workers in Canada, as well as structural changes to the labour market are some of the reasons for expecting many current workers to continue working past 65, the traditional age of retirement (Duchesne 2004).

6 Labour is the main ingredient or cost involved in producing goods, and the easiest to measure. However, capital (such as equipment), energy and materials are also factors in production. Multifactor productivity is an output calculation that captures the impact of changes in all the factors.

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